

NEW TAXA AND COMBINATIONS IN THE MYOPORACEAE

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Abstract

Two new subspecies in *Myoporum*, *M. boninense* subsp. *australe* and *M. platycarpum* subsp. *perbellum* and two new subspecies in *Eremophila*, *Eremophila bowmanii* subsp. *nutans* and *E. divaricata* subsp. *callewatta* are described. The following new combinations are made: *Eremophila debilis*, *Eremophila bowmanii* subsp. *latifolia*, *Eremophila oppositifolia* subsp. *rubra* and *Eremophila latrobei* subsp. *glabra*.

In preparation for the Myoporaceae treatment in volume 3 of the Flora of New South Wales expected to appear soon the following new subspecies are described and new combinations made.

1. *Myoporum boninense* subsp. *australe* Chinnock, *subsp. nov.* Fig. 1.A

Pogonia glabra Andr., Bot. Repos. 4: t. 283 (1803).

Type: Bot. Repos. 4: t. 283.

Myoporum ellipticum R. Br., Prod. 515 (1810), *nom. illeg.*

Type: *R. Brown s.n.* [Bennett No. 2802], Port Jackson, no date (BM, K).

Myoporum acuminatum var. *ellipticum* (R. Br.) Benth. based on *Myoporum ellipticum*.

Myoporum insulare sensu Beadle, Carolin & Evans, Fl. Syd. Region edn 3: 507 (1982).

a subsp. *boninensi* corolla intra hirsuta, floribus (1-) 2-5 (-8) in axillis differt.

Type: north side of Batemans Bay, New South Wales, R.J. Chinnock 6654, 8.ii.1986 (holotype: AD; isotypes: BRI, NSW, TI).

Notes

The cultivated plant upon which Andrews based *Pogonia glabra* originated from New Holland and was first raised from seed in England by a Mr Robertson in 1790. The plant depicted in Andrew's plate was drawn at the Hammersmith Nursery and as far as I can determine no pressed specimen was preserved.

Mueller (Myo. Pl. Austr. (1886) plate 70) indirectly published the name *Myoporum glabrum* through a descriptive illustration and gave no indication that the name was based on Andrews *Pogonia glabra*. The illustration, however, clearly depicts a form of *Myoporum montanum* R. Br.

Robert Brown based his *Myoporum ellipticum* on Andrews *Pogonia glabra* but unfortunately his name is illegitimate being superfluous at time of publication.



Fig. 1. *Myoporum boninense* subsp. *australe* (cult. Adelaide Botanic Garden). A, habit of prostrate branches; *Myoporum platycarpum* subsp. *platycarpum* (A.C. Robinson 750). B, pendulous branch showing the prominent flexuose arrangement of the flowering shoots and small flowers; *Myoporum platycarpum* subsp. *perbellum* (E.C. Black s.n., AD 97620122). C, habit showing the non-flexuose branch and large flowers (cf. B); *Eremophila bowmanii* subsp. *nutans* (R.J. Chinnock 6218). D, habit of branch; *Eremophila divaricata* subsp. *callewatta* (based on type). E, habit of branch with fruit enlarged. Illustration by G.R.M. Dashorst.

Koidzumi (Bot. Mag. Tokyo (1918) 32: 53) published *M. boninense* basing it on collections made by S. Nishimura on Chichisima Island in the Bonin group south-east of Japan. A study of material from this island group as well as the Marianas Islands further to the south (eg. Pagan, Roto, Guam) confirm that this species is also the widely spread one found along the eastern coast of Australia previously referred to as either *M. ellipticum* or *M. insulare*. This latter species replaces *M. boninense* in the extreme south of New South Wales and extends through coastal Victoria and South Australia to coastal Western Australia as far north as Shark Bay.

M. boninense is here divided into two subspecies on the basis of floral indumentum and the number of flowers per axil.

Myoporum boninense is the most widely spread species of *Myoporum* and its distribution over such a long distance between the Bonin Islands (28°N) and Australia (13°S northernmost Australia occurrence) may possibly be accounted for through bird dispersal. According to Mr S. Parker, S.A. Museum, the short tailed - shearwater migrates between Australia and these island areas to the north.

The subspecific epithet alludes to this subspecies being the southern form of the species.

2. *Myoporum platycarpum* subsp. *perbellum* Chinnock, *subsp. nov.* Fig. 1.C

a subsp. *platycarpo* corollarum lobis tubum aequantibus vel longioribus; arboribus ramis floralibus non valde flexuosis; folio pedicellique vestigio non formanti nodosis prominentibus differt.

Type: 10 km E of Sedan, South Australia, R.J. Chinnock 2974, 9.xi.1975 (holotype: AD; isotypes: K, KSC, MEL, NSW).

Notes

This subspecies is readily distinguished by its larger more prominent flowers 8-16 mm diameter and the floral branches not obviously flexuous. Leaf and pedicel remnants do not form prominent knobs found in the type subspecies (Fig. 1.B) except very rarely in some New South Wales populations.

It extends from south eastern South Australia to north-western Victoria and also occurs in central southern New South Wales. It is usually associated with mallee woodlands forming a tall multistemmed shrub or rarely a small tree. *M. platycarpum* subsp. *platycarpum* however, is most commonly associated with *Acacia* woodlands especially *A. aneura* and *A. papyrocarpa* or it forms open woodlands over chenopod shrublands.

The subspecific epithet refers to the larger more attractive flowers found in this subspecies.

3. *Eremophila debilis* (Andr.)Chinnock, *comb. nov.*

Pogonia debilis Andr., Bot. Repos. 3: t. 212 (1802).

Type: Bot. Repos. 3: t. 212.

Andreusia debilis (Andr.)Vent., Jard. Malm. tab. 108 (1803).

Myoporum debile (Andr.)R. Br., Prod. 516 (1810).

Notes

Features of the flower and fruit clearly place this species in *Eremophila*. The corolla has a long narrow cylindrical lower portion and irregularly arranged lobes with the medial one of the lower lip usually projected forward. Unlike *Myoporum* the sepals are larger, lanceolate to oblanceolate and have an outer three inner pair arrangement. The large fruit is fleshy but not watery like *Myoporum* and the endocarp is distinctly compressed with the two carpels free in the upper fifth. This latter feature occurs in a number of sections of *Eremophila*.

4a. *Eremophila bowmanii* subsp. *nutans* Chinnock, subsp. nov. Fig. 1.D

a subsp. *bowmanio* foliis ovatis ad suborbiculatis raro oblanceolatis, foliis pedicellisque grosse dendritico-tomentosis, floribus nutantibus differt.

Type: 9.5 km S of junction with the Quilpie - Windorah road, on Thargomindah road, Queensland, *R.J. Chinnock 6219*, 23.ix.1984 (holotype: AD; isotypes: BRI, CANB, K, MEL, MO, NSW).

Notes

This is a much smaller plant than the other two subspecies favouring stony red-brown clay flats or rocky rises usually as small populations in low *Acacia* woodlands (*A. cambagei*, *A. aneura*) often with other species of *Eremophila* and *Senna*. It is restricted to the Warrego District in Queensland and extends just over the border to near Yantabulla in New South Wales.

The subspecific epithet refers to the flowers which become nodding as the fruit develop.

4b. *Eremophila bowmanii* subsp. *latifolia* (L.S. Smith)Chinnock, stat. nov.

Eremophila bowmanii var. *latifolia* L.S. Smith, Contr. Qld Herb. 19: 24 (1975).

Type: Bulloo River, New South Wales, *L. Morton s.n.*, 1887 (holotype: MEL).

5. *Eremophila divaricata* subsp. *callewatta* Chinnock, subsp. nov. Fig. 1.E

a subsp. *divaricata* ramis foliis fructisque stellato-pubescentibus differt.

Type: North Bourke between the Darling River and Polygonum Swamp, New South Wales, *R.J. Chinnock 6325*, 27.ix.1984 (holotype: AD; isotypes: AD, BRI, K, MEL, NSW, PERTH, US).

Notes

This subspecies is known only from the vicinity of Bourke where it grows on the floodplains of the Darling River. It is easily distinguished from subsp. *divaricata* by the stellate tomentum covering the branches, leaves and fruits. In the type subspecies stellate hairs are restricted to just above the leaf axil and never present on the leaves or fruit.

The subspecific epithet is taken from an Aboriginal name for the Darling River.

6. *Eremophila oppositifolia* subsp. **rubra** (C. White & Francis)Chinnock, stat. nov.

Eremophila oppositifolia var. *rubra* C. White & Francis, Proc. Roy. Soc. Qld 37: 162 (1926).

Type: Near Wilson River, south-western Queensland, *W. MacGillivray s.n.*, 4.ix.1923 (holotype: BRI 192741; isotype: K).

7. *Eremophila latrobei* subsp. **glabra** (L.S. Smith)Chinnock, stat. nov.

Eremophila latrobei var. *glabra* L.S. Smith, Contr. Qld Herb. 19: 21 (1975).

Type: Tenham near Windorah, Queensland, *S.T. Blake 12030*, vi.1936 (holotype: BRI).